



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/783,261	02/19/2004	Yukihiro Asa	60094-0012	7314
29989	7590	10/04/2005		
HICKMAN PALERMO TRUONG & BECKER, LLP 2055 GATEWAY PLACE SUITE 550 SAN JOSE, CA 95110			EXAMINER BARRERA, RAMON M	
			ART UNIT 2832	PAPER NUMBER

DATE MAILED: 10/04/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/783,261

Applicant(s)

ASA, YUKIHIRO

Examiner

Ramon M. Barrera

Art Unit

2832

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-17 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 19 February 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☒ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 6/24/04.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: ____.

DETAILED ACTION

Oath/Declaration

1. The oath or declaration is defective. A new oath or declaration in compliance with 37 CFR 1.67(a) identifying this application by application number and filing date is required. See MPEP §§ 602.01 and 602.02.

The oath or declaration is defective because:

It does not identify the foreign application for patent or inventor's certificate on which priority is claimed pursuant to 37 CFR 1.55, and any foreign application having a filing date before that of the application on which priority is claimed, by specifying the application number, country, day, month and year of its filing.

It does not identify the citizenship of each inventor.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 1-17 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claims 1, 5, 7, 12, and 14, "hole" should be changed to --Hall--. In claim 3, "guiding the movable member" should be changed to --positioning the Hall IC—for correspondence with the specification. In claim 5, line 2, "the opening" should be changed to --an opening--. In claim 6, "said base" should be changed to --a base--. In claim 8, on line 3, "said output" should be changed to --an output--. Claims 2, 4, 9-11, 13, and 15-17 inherit the defect in their parent claims.

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

5. Claims 1, 3, 4, 7, 10, 12, 16, and 17 are rejected under 35 U.S.C. 102(b) as being anticipated by Würscher, et al.

Würscher discloses switch case 1, movable member 3, elastic body 13, permanent magnet 4, Hall IC 8, positioning portion 7, and guide 2. It is noted that an injection hole reads on any opening in switch case 1, e.g, the deriving hole for the IC leads.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over Würscher, et al..

Würscher, et al., discloses the claimed invention except for wherein when the end portion of said movable member projects outwardly of said switch case the hole IC outputs an ON signal and when the end portion of said movable

member is depressed and moves inwardly the hole IC outputs an OFF signal. It would have been an obvious matter of design choice to design for actuation resulting in on or off signaling, since applicant has not disclosed that this solves any stated problem or is for any particular purpose and it appears that the invention would perform equally well with either signal.

8. Claims 1,3,4,6,7,10,12,13,14,15,and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brevick, cited on Applicant's IDS, in view of Longly, et al.

Brevick discloses a switch case with positioning 58 and guide (45,46) portions, movable member 12, spring element 32, permanent magnet 25, base member 35, synthetic resin materials (col. 3, lines 47-48), and a switch case engaging hole constituted by any hole in the switch case, e.g., the hole for insertion of mounting stud 17. It is noted that an injection hole reads on any opening in lid member 18. Regarding the recitation of an operating force of 1g, it would have been obvious to one having ordinary skill in the art at the time the invention was made to design for an operating force of 1g, since it has been held that discovering an optimum value of a result effective variable involves only routine skill in the art. *In re Boesch*, 617 F.2d 272, 205 USPQ 215 (CCPA 1980).

Brevick discloses using a reed switch instead of a Hall IC. Brevick states in col.3, lines 33-36, that other types of magnetically actuated switches may be employed, if desired. Longly, et al., in col. 4, lines 63-67, shows that a Hall IC is an equivalent structure known in the art. Therefore, because these two magnetically actuated

switches were art-recognized equivalents at the time the invention was made, one of ordinary skill in the art would have found it obvious to substitute a Hall IC for a reed switch in Brevick. Concerning actuation resulting in on or off signaling, it would have been an obvious matter of design choice to design for actuation resulting in on or off signaling, since applicant has not disclosed that this solves any stated problem or is for any particular purpose and it appears that the invention would perform equally well with either signal.

9. Claims 5, 8, and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brevick, cited on Applicant's IDS, in view of Longly, et al., and further in view of Brown.

Brevick in view of Longly discloses the claimed invention except for the lid member 35 including an injection hole and silicon resin injected through said injection hole, said silicon resin sealing the bottom of said switch case. Brevick in view of Longly and Brown deal with electrical components contained within housings. Brown discloses a lid member 18 including an injection hole 18b and resin injected through said injection hole, said resin for fixing electrical components within the case and for sealing the bottom of the case. It would have been obvious at the time the invention was made to a person having ordinary skill in the art to include an injection hole and resin injected through said injection hole in Brevick in view of Longly because fixing electrical components within housings was known to be reasonably pertinent to the art of Brevick in view of Longly. Although Brown disclosed an epoxy resin, it would have been obvious to one having ordinary skill in the art at the time the invention was made to employ a silicon resin, since it has been held to be within the general skill of a worker in

Art Unit: 2832

the art to select a known material on the basis of its suitability for the intended use as a matter of obvious design choice. *In re Leshin*, 125 USPQ 416.

Allowable Subject Matter

10. Claims 2 and 11 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.


11. The following is a statement of reasons for the indication of allowable subject matter: None of the prior art of record taught or disclosed wherein the magnetic field threshold from an OFF state to an ON state is higher than the magnetic field threshold from an ON state to an OFF state.

12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ramon M. Barrera whose telephone number is (571) 272-1987. The examiner can normally be reached on Monday through Friday from 11 to 5PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Elvin G. Enad can be reached on (571) 272-1990. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2832

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


Ramon M Barrera
Primary Examiner
Art Unit 2832

rmb